

Snake River Oil and Gas, LLC
117 East Calhoun – P.O. Box 500
Magnolia, Arkansas 71753

August 21, 2020

DELIVERED BY ELECTRONIC-MAIL

Ms. Karen Burgess, Groundwater and Drinking Water Section Chief
United States Environmental Protection Agency – Region 10
1200 Sixth Avenue, Suite 155
Seattle, WA 98101-3188

Re: Aquifer Exemption Request Associated with UIC Permit Application No. ID-2D001-A
(Resubmittal) – First Notice (Technical Review Phase)

Dear Ms. Burgess:

This letter transmits Snake River Oil and Gas, LLC's response to your June 18, 2020 comments letter regarding the subject Aquifer Exemption Request ("AER"). The subject AER has been updated and is being submitted at the same time as this letter. The purpose of this letter is to explicitly respond to the comments in the 6/18/2020 letter and provide direction to where those comments and questions have been addressed in the updated AER. Attachment A is a list of the items with a response for each one, usually just providing directions to the section of the AER where that item is discussed. Attachment B is a copy of the 6/18/2020 letter.

Please let us know if additional information is needed or if you have any questions.

Thank you for your efforts and help in this matter.

Sincerely,

Mr. Richard Brown
Manager
Snake River Oil and Gas, LLC

Attachments:

1. Attachment A – SROG Responses to 6/18/2020 Letter
 2. Attachment B – Copy of 6/18/2020 Letter from EPA to SROG
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Attachment A

SROG Responses to 6/18/2020 Letter

This attachment addresses each item in the June 18, 2020 Letter from the United States Environmental Protection Agency – Region 10 to Snake River Oil and Gas, LLC, regarding the Aquifer Exemption Request Associated with UIC Permit Application No. ID-2D001-A (Resubmittal) - First Notice (Technical Review Phase) [**The Letter**]. See Attachment B for a copy of this letter.

From page 2, 2nd paragraph in Attachment 1 to The Letter :

Question / Comment:

The EPA has not received sufficient evidence and discourse from SROG that would lead the Agency to determine that the portions of this aquifer requested for exemption will not reasonably be used for drinking water in the future.

Response:

This is addressed in Sections X, XI, and XII of this updated Aquifer Exemption Request(AER). Section X addresses geolocation and the resultant high comparative costs associated with this factor. Section XI addresses the contamination of the water in this aquifer and the associated costs for removal of the contaminants to provide drinking water. Section XII discusses the supply and demand outlook for this area and provides some perspective on the relative size of this resource to the supply in the Payette River Basin.

From page 2, 3rd paragraph in Attachment 1 to The Letter:

Question/Comment:

Additionally, the EPA has concerns that the areal extent of the AE area may not be accurately sized. Further, the Agency has not received sufficient evidence and discourse from SROG regarding the projected fluid movement behavior, resulting from injection, in the Willow Sand aquifer. SROG must clearly define and support the boundary of the portion of the aquifer it proposed for exemption and support this boundary with enough evidence to allow EPA to make a determination that the movement of fluids injected will remain within the boundaries of the AE proposed by SROG.

Response:

The updated AER now proposes the borders of the requested aquifer exemption area to conform with the boundaries of Fault Block E. This is addressed in Section III of this updated AER.

From page 3, comment 1, paragraph 3 in Attachment 1 to The Letter:

Question, Comment:

Regarding claims that the aquifer portion identified by SROG in its AE request for exemption is too deep to be considered a reasonable future water supply (i.e., subpart (b)(2)), or too contaminated (i.e., subpart (b)(3)), SROG has not provided sufficient evidence that production and treatment of this water is economically or technologically impractical. Further, missing from this AE request is information addressing factors in water supply and demand, including, but not limited to: the current costs of nearby public water, possible expansion of nearby urban, suburban, and rural residential areas relying on public water sources, projected population changes in nearby population centers, possible increase in water competition for non-drinking water purposes (i.e., industrial water use, agricultural water use, etc.), and projected surface vs groundwater needs related to both future availability against demand.

Response:

The updated AER addresses the issue of depth and location in Section X, by presenting a scenario that illustrates that the aquifer defined by Fault Block E is geolocated such that the economics of accessing the aquifer with a deep well and transporting the water to be used by a nearby community is economically irrational, given the cost of current and other alternative sources for water. The updated AER also addresses the issue of contamination by presenting a scenario in Section XI that shows that the economics of treating the water to remove the contaminants in the water to be an expensive and economically impractical, given the other less expensive water resources available. Alternative water sources are discussed in Section X, with shallower wells and also the Idaho Water Supply bank and Rental Pools. The water supply and demand issue is also addressed by Section XII. It is shown that there is little concern about the future of the water supply in this area and that besides, the magnitude of this resource is negligible relative to the amount of annual basin supply for the Payette River Basin.

From page 3, comment 1, paragraph 4 in Attachment 1 to The Letter:

Question, Comment:

Any assertion by SROG that focuses on the economic viability of drilling to the depth of the Willow sands should account for how water production—rather than simply hydrocarbon production—impacts potential costs (for example, the Fallon 1-10 well example used by SROG fails to consider cost-lowering impacts, such as drilling to more easily accessible zones and differences in the build materials of the well). Additionally, assertions by SROG that focus on the economic unviability of treating water from the Willow Sands should account for estimated lowest-costs methods for: water collection, treatment, and conveyance to communities in the areas surrounding the proposed AE.

Response:

The updated AER includes in Section X the costs for a well which is designed to produce water from Fault Block E. It is designed as a water well and the construction design concerns for this specific location and purpose are discussed. A cost estimate is also presented for a well that could produce much shallower targets in locations nearby Fault Block E and also in other areas much closer to the nearby communities so that the pipeline costs could be reduced significantly. The alternative water source provided by the Idaho Water Bank and the Rental Pools is also discussed. Section XI addresses water treatment and methods.

From page 3, comment 2, paragraph 1 in Attachment 1 to The Letter:

Question, Comment:

2. SROG has chosen an areal extent of the portion of the aquifer requested for exemption extending approximately four-square miles, overlaying much of the portions of the Willow Sands producing hydrocarbons. In Section IX of the AE Request, "Discussion of Boundaries of the Proposed Aquifer Exemption Area," SROG states that injected fluids will be hydraulically isolated to Block E because SROG asserts that the faults making up Block E will be self-sealing. However, to account for a scenario in which these faults are not sealing, SROG provides a flow diagram that depicts how fluids could possibly move based on differences in formation pressures across fault lines (Exhibit IX-C). It appears that it is this alternative scenario, to the one where Block E contains self-sealing faults, that causes SROG to draw the boundaries of the portion of the aquifer requested for exemption to the four-square mile expanse it submitted in its AE request. The EPA does not have enough information to determine whether the requested areal extent of the portion of the aquifer requested for exemption reflects the smallest portion of the aquifer necessary to accommodate the UIC Class II disposal well permit activity. Alternatively, should Block E not contain self-sealing faults, EPA does not have enough information to determine whether the requested areal extent of the portion of the aquifer requested for exemption appropriately encompasses the possible distribution of fluids.

Response:

The updated AER has boundaries that conform to the extent of Fault Block E – See Sections III and IX in the AER. Flow outside of Fault Block E is not expected the questions here are believed to no longer be an issue.

From page 3, comment 2a, in Attachment 1 to The Letter:

Question, Comment:

- Provide information regarding the known or suspected groundwater flow direction within the various fault blocks in the submitted AE request materials, and across the Willow Sands, before hydrocarbon extraction.

Response:

The updated AER has boundaries that conform to the extent of Fault Block E. Flow outside of Fault Block E is not expected. and Section VIII discusses reservoir seal competency. Fault Block E has not been produced and there is no known groundwater flow in this Fault Block as this is believed to be a confined reservoir. References are now included in the updated AER that have previously concluded that this area shows little groundwater mobility, as indicated by an area study of historical wells and the isotherms (See Exhibits VIII-J and VIII-K and the associated description of these exhibits.)

From page 4, comment 2b, in Attachment 1 to The Letter:

Question, Comment:

- b. With regards to the movement of fluids due to pressure differentials, provide information regarding how the reservoir pressure relationships between fault blocks will change if producing wells are shut-in permanently (e.g., ML 3-10 ceasing injection).

Response:

The updated AER has boundaries that conform to the extent of Fault Block E (See Section III). Flow outside of Fault Block E is not expected and seal competency is discussed in Section VIII. Each of the fault blocks is believed to be self-confined, so the expectation is that there will be no change when wells are shut-in. There is no proposed injection into the ML 3-10.

From page 4, comment 2c, in Attachment 1 to The Letter:

Question, Comment:

- c. Provide information regarding how the fault between the edge of Block E and the eastern edge of the proposed AE area provides confinement. For example, is any information available about the sealing nature of the north-easternmost fault shown on Exhibit VIII-A (the fault depicted as a the eastern-most barrier of zones C, B, and E)?

Response:

The updated AER addresses the apparent sealing nature of this fault in the text describing Exhibit VIII-C.

From page 4, comment 2d, in Attachment 1 to The Letter:

Question, Comment:

- d. Provide information regarding whether physical properties (i.e., temperature) of the injected fluid would influence the transport of injected fluids in horizontal and/or vertical directions.

Response:

The updated AER addresses this issue in Section XIII.

From page 4, comment 2e, in Attachment 1 to The Letter:

Question, Comment:

- e. Provide information regarding whether the sealing nature of the fault that runs between Blocks A and B extends through the contact with block E (i.e., when the fault passes into Sections 13 and 14 as depicted in Exhibit VI-C).

Response:

The updated AER addresses this in Section VIII when the seal between fault blocks A and B are discussed..

From page 4, comment 2f, in Attachment 1 to The Letter:

Question, Comment:

- f. Provide information regarding the relationship between Blocks B and E. For example, can SROG provide a comparison of any pressure data across this fault boundary, i.e.,

ML#2-10 and ML#1-11 in (in Block B) with DJS #2-14 (in Block E) that demonstrates fault sealing?

Response:

The updated AER presents this information in the text description of Exhibit VIII-I. Due to the timing of the swab testing of the DJS 2-14, there is no significant data that provides evidence of separation.

From page 4, comment 2g, in Attachment 1 to The Letter:

Question, Comment:

- g. Provide information regarding how the volume of fluid that would be injected over the lifespan of the injection well would define the aquifer exemption boundary (assuming non-confinement to Block E).

Response:

The updated AER presents this information in Section IX in the form of a simplistic volumetric calculation of the radius that would be filled by the proposed injection capacity calculated volume.

From page 4, comment 3, in Attachment 1 to The Letter:

Question, Comment:

3. Please explain the relevance of the seal between Blocks C and D and between Blocks B and C (described on pages 68-75 of the application) in the proposed aquifer exemption request.

Response:

The updated AER addresses the rationale of the significance of these sealing faults in the discussion of Exhibit VIII-D and Exhibit VIII-G.

From page 4, comment 4, in Attachment 1 to The Letter:

Question, Comment:

4. Exhibit VII-D displays water quality information from well ML #1-10. It appears that the samples were all taken on 1/5/2013 at a depth of 4,096 ft., but have a wide range in Total Dissolved Solids (two samples contain about 2,000 mg/L and a third contains 15,982 mg/L). Please explain this disparity.

Response:

The updated AER addresses this issue in Section VII. It is suspected that the sample with high TDS may have been contaminated with the work fluid used during the completion, and the other samples are more representative of in situ formation water.

From page 4, comment 5, in Attachment 1 to The Letter:

Question, Comment:

5. Please correct the discrepancies between Exhibit VII-D and Appendix VII:

- The TDS values of the samples from AMS DJS #2-14 and AMS DJS 1-15 appear to be transposed on the exhibits.
- The last value on the table (the 2016 sample of 1,349 mg/L) appears to be from ML #110, as referenced on page 34 of 39 in the Aquifer Exemption Request. Please confirm and revise.

Response:

The updated AER has corrected the typos in this table.

From page 4, comment 6, in Attachment 1 to The Letter:

Question, Comment:

6. Are any TDS data available from the Willow Sands aquifer from east of the injection well? Alternatively, is this information available from the Boise Petroleum Keine 1 well?

Response:

The subject well was only drilled to 2500', consequently the Willow Sands were not reached. This has been noted in Section VII of the updated AER.

From page 4, comment 7, in Attachment 1 to The Letter:

Question, Comment:

7. It appears that Exhibit IX-A on page 83 is mislabeled; based on the text, this should be Exhibit XI-A. Please confirm.

Response:

Exhibit IX-A was mislabeled and the updated AER has corrected this issue.

From page 5, comment 8, in Attachment 1 to The Letter:

Question, Comment:

8. The seismic data and resultant cross sections that support the confinement discussion for the AE are presented in the Class II permit application, but not the AE application. Please submit and attest to these figures (i.e., Figure G-9 of the Class II permit application) in the AE application for completeness

Response:

We spoke to Mr. E. Osborne about this question and concluded that intended Figure designations were G10, G-11A and G-11B. The updated AER includes this information in Section VI, as Exhibits VI-I, VI-J, and VI-K.

From page 5, comment 9, in Attachment 1 to The Letter:

Question, Comment:

9. Please clarify why the isopach map on page 77 appears to depict the Willow Sands aquifer reaching a thickness of 0', including discussion of the apparent decrease in the Willow Sands thickness along the B-E fault blocks.

Response:

The updated AER explains this in Section IX.

From page 5, comment 10, in Attachment 1 to The Letter:

Question, Comment:

10. There is only one water quality analysis presented for DJS 2-14. Have any water quality analyses been conducted on samples taken from the Willow Sands aquifer within the boundaries of Block E (i.e., from well DJS 2-14)?

Response:

The sample presented is the only water sample analysis available from Fault Block E. The updated AER makes note of this in Section VII.

From page 5, comment 11, in Attachment 1 to The Letter:

Question, Comment:

11. Exhibit IV-E displays an outline of the areal extent of the requested aquifer exemption boundary and includes six light-blue colored dots on the inside of that boundary indicating locations of water wells. Exhibit IV-F lists all water wells within the AE boundary. Please modify Exhibit IV-F so that the well locations shown on the map can be cross-referenced with the well details in Exhibit IV-F.

Response:

The updated AER has no water wells inside the AEA boundary.

The above is the complete list of comments in The Letter, and it is believed that all concerns have been addressed by the updated AER.

Attachment B

Letter dated June 18, 2020 Letter from the United State Environmental Protection Agency – Region 10 to Snake River Oil and Gas, LLC, regarding the Aquifer Exemption Request Associated with UIC Permit Application No. ID-2D001-A (Resubmittal) - First Notice (Technical Review Phase) – follows on next 5 pages



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY REGION 10

1200 Sixth Avenue, Suite 155

Seattle, WA 98101-3188

WATER DIVISION

June 18, 2020

DELIVERED BY ELECTRONIC-MAIL

Mr. Richard Brown, Manager
Snake River Oil and Gas, LLC
117 East Calhoun – P.O. Box 500
Magnolia, Arkansas 71753

Re: Aquifer Exemption Request Associated with UIC Permit Application No. ID-2D001-A
(Resubmittal) - First Notice (Technical Review Phase)

Dear Mr. Brown,

This letter transmits the U.S. Environmental Protection Agency's ("EPA") comments regarding Snake River Oil and Gas, LLC's ("SROG") Aquifer Exemption ("AE") Request. SROG submitted its initial AE request on March 10, 2020, along with the initial Underground Injection Control (UIC) Class II permit application submittal.

On June 10, 2020, the EPA provided SROG with a list of comments made in response to SROG's permit application for a UIC Class II Disposal well at the Little Willow Facility in Payette County, Idaho.

To ensure timely processing of the permit application and AE Request, respond to both this letter (i.e. AE comments) and the June 10, 2020 letter (i.e., Permit application comments) by July 24, 2020. If you are unable to respond by this date, please contact our office to discuss a timeline for your response. If you have questions or seek clarification for these comments, please contact Evan Osborne at osborne.evan@epa.gov or (206) 553-1747 to schedule a time to meet.

Sincerely,

6/18/2020

X 

Karen Burgess
Groundwater and Drinking Water Section Chief
Signed by: KAREN BURGESS

Attachments

1. Comment on the Aquifer Exception Request

Attachment 1

Comments on the Aquifer Exemption Request:

Underground Sources of Drinking Water (“USDWs”) are broadly defined in the Safe Drinking Water Act (“SDWA”) in order to protect current and future drinking water sources from endangerment. Injection of fluids that may result in an exceedance of a primary drinking water standard or may otherwise adversely affect the health of persons in a USDW is banned (See 40 CFR 144.12). Exempting an aquifer (i.e., an Aquifer Exemption, or “AE”), effectively removes the USDW designation from that aquifer. SROG’s request to inject into well DJS 2-14 proposes the injection of fluids into an aquifer that meets the criteria of a USDW, so the company has requested that EPA issue an aquifer exemption (“AE”) for a portion of the aquifer that may be affected by this injection. The current extent of the aquifer exemption request covers approximately four-square miles, projected to the surface, as depicted in figures III-B and III-A of the aquifer exemption request, and occurring between 4,000 and 6,000 feet below ground surface.

To demonstrate that the portion of the Willow Sands aquifer requested for exemption is not currently being used as a drinking water source, SROG provided location and depth information of water wells located in the aquifer exemption area and determined that there are no water wells deeper than 215’ below ground surface. Based on the AE Request, EPA agrees with SROG that the groundwater found within the Willow Sands in the prospective exemption area is not currently used for drinking water. The EPA has not received sufficient evidence and discourse from SROG that would lead the Agency to determine that the portions of this aquifer requested for exemption will not reasonably be used for drinking water in the future.

Additionally, the EPA has concerns that the areal extent of the AE area may not be accurately sized. Further, the Agency has not received sufficient evidence and discourse from SROG regarding the projected fluid movement behavior, resulting from injection, in the Willow Sand aquifer. SROG must clearly define and support the boundary of the portion of the aquifer it proposed for exemption and support this boundary with enough evidence to allow EPA to make a determination that the movement of fluids injected will remain within the boundaries of the AE proposed by SROG.

Finally, EPA has identified several areas of the AE request that require contextual clarification and/or correction.

Please review and address the following comments either by submitting an updated AE Request, or submitting a stand-alone response to this letter that sufficiently addresses each comment in a numbered fashion.

1. SROG suggests that the portion of the Willow Sands aquifer sought for exemption is not reasonably expected to become a future drinking water source. A requestor may provide evidence supporting such a claim pursuant to 40 CFR § 146.4(b). To date, SROG has failed to demonstrate to EPA that the

portion of the Willow Sands aquifer identified in its AE request meets any one of the acceptable criteria for AE associated with UIC Class II disposal wells in 146.4(b). SROG must supplement, revise, and resubmit an aquifer exemption request that meets one of these criteria intended to demonstrate that the AE request and associated UIC Class II disposal well will not affect future drinking water sources.

Regarding any claim that the requested AE zone can be shown to be commercially producible (i.e., subpart (b)(1)), the EPA has not received sufficient evidence and discourse supporting the assertion that the “E Block: portion of the Willow Sands, identified in the AE request materials, near the DJS 2-14 wellbore, should be considered a viable commercial source of hydrocarbons.

Regarding claims that the aquifer portion identified by SROG in its AE request for exemption is too deep to be considered a reasonable future water supply (i.e., subpart (b)(2)), or too contaminated (i.e., subpart (b)(3)), SROG has not provided sufficient evidence that production and treatment of this water is economically or technologically impractical. Further, missing from this AE request is information addressing factors in water supply and demand, including, but not limited to: the current costs of nearby public water, possible expansion of nearby urban, suburban, and rural residential areas relying on public water sources, projected population changes in nearby population centers, possible increase in water competition for non-drinking water purposes (i.e., industrial water use, agricultural water use, etc.), and projected surface vs groundwater needs related to both future availability against demand.

Any assertion by SROG that focuses on the economic viability of drilling to the depth of the Willow sands should account for how water production—rather than simply hydrocarbon production—impacts potential costs (for example, the Fallon 1-10 well example used by SROG fails to consider cost-lowering impacts, such as drilling to more easily accessible zones and differences in the build materials of the well). Additionally, assertions by SROG that focus on the economic unviability of treating water from the Willow Sands should account for estimated lowest-costs methods for: water collection, treatment, and conveyance to communities in the areas surrounding the proposed AE.

(Note: SROG need only demonstrate that one of the criteria found at 40 CFR § 146.4(b) apply in this situation).

2. SROG has chosen an areal extent of the portion of the aquifer requested for exemption extending approximately four-square miles, overlaying much of the portions of the Willow Sands producing hydrocarbons. In Section IX of the AE Request, “Discussion of Boundaries of the Proposed Aquifer Exemption Area,” SROG states that injected fluids will be hydraulically isolated to Block E because SROG asserts that the faults making up Block E will be self-sealing. However, to account for a scenario in which these faults are not sealing, SROG provides a flow diagram that depicts how fluids could possibly move based on differences in formation pressures across fault lines (Exhibit IX-C). It appears that it is this alternative scenario, to the one where Block E contains self-sealing faults, that causes SROG to draw the boundaries of the portion of the aquifer requested for exemption to the four-square mile expanse it submitted in its AE request. The EPA does not have enough information to determine whether the requested areal extent of the portion of the aquifer requested for exemption reflects the smallest portion of the aquifer necessary to accommodate the UIC Class II disposal well permit activity. Alternatively, should Block E not contain self-sealing faults, EPA does not have enough information to determine whether the requested areal extent of the portion of the aquifer requested for exemption appropriately encompasses the possible distribution of fluids.

Please address the following:

- a. Provide information regarding the known or suspected groundwater flow direction within the various fault blocks in the submitted AE request materials, and across the Willow Sands, prior to hydrocarbon extraction.

- b. With regards to the movement of fluids due to pressure differentials, provide information regarding how the reservoir pressure relationships between fault blocks will change if producing wells are shut-in permanently (e.g., ML 3-10 ceasing injection).
- c. Provide information regarding how the fault between the edge of Block E and the eastern edge of the proposed AE area provides confinement. For example, is any information available about the sealing nature of the north-easternmost fault shown on Exhibit VIII-A (the fault depicted as a the eastern-most barrier of zones C, B, and E)?
- d. Provide information regarding whether physical properties (i.e., temperature) of the injected fluid would influence transport of injected fluids in horizontal and/or vertical directions.
- e. Provide information regarding whether the sealing nature of the fault that runs between Blocks A and B extends through the contact with block E (i.e., when the fault passes into Sections 13 and 14 as depicted in Exhibit VI-C).
- f. Provide information regarding the relationship between Blocks B and E. For example, can SROG provide a comparison of any pressure data across this fault boundary, i.e., ML#2-10 and ML#1-11 in (in Block B) with DJS #2-14 (in Block E) that demonstrates fault sealing?
- g. Provide information regarding how the volume of fluid that would be injected over the lifespan of the injection well would define the aquifer exemption boundary (assuming non-confinement to Block E).

Depending on the nature of SROG's internal review of the information and supporting evidence requested by EPA above, it may be warranted for SROG to consider changes to the requested areal or vertical limits of the aquifer exemption boundary to match the expected boundary of fluid movement. Regardless of whether the boundary size of the AE request changes, please provide a shapefile of the geospatial areal extent of the portion of the aquifer proposed for exemption and latitude/longitude information for the significant boundary points (i.e. corners if the area is four-sided, vertices if the shape is irregularly shaped).

3. Please explain the relevance of the seal between Blocks C and D and between Blocks B and C (described on pages 68-75 of the application) in the proposed aquifer exemption request.

4- Exhibit VII-D displays water quality information from well ML #1-10. It appears that the samples were all taken on 1/5/2013 at a depth of 4,096 ft., but have a wide range in Total Dissolved Solids (two samples contain about 2,000 mg/L and a third contains 15,982 mg/L). Please explain this disparity.

5-Please correct the discrepancies between Exhibit VII-D and Appendix VII:

- The TDS values of the samples from AMS DJS #2-14 and AMS DJS 1-15 appear to be transposed on the exhibits.
- The last value on the table (the 2016 sample of 1,349 mg/L) appears to be from ML #110, as referenced on page 34 of 39 in the Aquifer Exemption Request. Please confirm and revise.

6-Are any TDS data available from the Willow Sands aquifer from east of the injection well? Alternatively, is this information available from the Boise Petroleum Keine 1 well?

7-It appears that Exhibit IX-A on page 83 is mislabeled; based on the text, this should be Exhibit XI-A. Please confirm.

8.- The seismic data and resultant cross sections that support the confinement discussion for the AE are presented in the Class II permit application, but not the AE application. Please submit and attest to these figures (i.e., Figure G-9 of the Class II permit application) in the AE application for completeness.

9.- Please clarify why the isopach map on page 77 appears to depict the Willow Sands aquifer reaching a thickness of 0', including discussion of the apparent decrease in the Willow Sands thickness along the B-E fault blocks.

10.- There is only one water quality analysis presented for DJS 2-14. Have any water quality analyses been conducted on samples taken from the Willow Sands aquifer within the boundaries of Block E (i.e., from well DJS 2-14)?

11.- Exhibit IV-E displays an outline of the areal extent of the requested aquifer exemption boundary and includes six light-blue colored dots on the inside of that boundary indicating locations of water wells. Exhibit IV-F lists all water wells within the AE boundary. Please modify Exhibit IV-F so that the well locations shown on the map can be cross-referenced with the well details in Exhibit IV-F.